

Title (en)
Regenerative heat exchanger

Title (de)
Regenerativer Wärmetauscher

Title (fr)
Échangeur de chaleur régénératif

Publication
EP 2743624 A1 20140618 (EN)

Application
EP 12197258 A 20121214

Priority
EP 12197258 A 20121214

Abstract (en)
The leakage reduction system 1000 includes a heat exchanger 100, a duct arrangement 200 and a separation arrangement 300. The heat exchanger 100 includes a rotor assembly 102 rotatably mounted along a rotor post 104. The heat exchanger 100 further includes a second inlet plenum 112a, whereat the duct arrangement 200 is configured. Further, the separation arrangement 300 is incorporated at the duct arrangement 200 dividing thereto into primary and secondary inlets 210, 220. Through the primary inlet 210, a flue gas enriched with Oxygen is carried, and through the secondary inlet 220 a recycled flue gas flow is allowed to be carried, keeping the Oxygen enriched recycled flue gas flow substantially away from the rotor post region 104 to avoid turnover towards a flue gas flow, reducing leakage thereof.

IPC 8 full level
F28D 19/04 (2006.01)

CPC (source: EP KR US)
F23B 80/00 (2013.01 - KR); **F23C 9/00** (2013.01 - US); **F23J 11/00** (2013.01 - KR); **F23L 7/00** (2013.01 - KR); **F23L 15/02** (2013.01 - KR US); **F28D 19/041** (2013.01 - EP US); **F28D 19/047** (2013.01 - EP US); **Y02E 20/12** (2013.01 - EP US); **Y02E 20/34** (2013.01 - EP US)

Citation (search report)
• [X] DE 1113534 B 19610907 - KRAFTANLAGEN AG
• [X] US 3321011 A 19670523 - GEORG KALBFLEISCH, et al
• [X] US 1970127 A 19340814 - COLBY HALDWELL S, et al
• [X] US 2899179 A 19590811

Designated contracting state (EPC)
AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)
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DOCDB simple family (publication)
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